PATENT COOPERATION TREATY

From the INTERNATIONAL BUREAU

PCT

NOTIFICATION OF ELECTION

(PCT Rule 61.2)

To:

United States Patent and Trademark Office
(Box PCT)
Crystal Plaza 2
Washington, DC 20231
ÉTATS-UNIS D'AMÉRIQUE

in its capacity as elected Office

Date of mailing (day/month/year) 12 March 1999 (12.03.99)	
International application No. PCT/US98/15411	**Applicant's or agent's file reference** 234/231 PCT
International filing date (day/month/year) 24 July 1998 (24.07.98)	**Priority date** (day/month/year) 25 July 1997 (25.07.97)
Applicant BRIGGS, Michael, R. et al	

1. The designated Office is hereby notified of its election made:

[X] in the demand filed with the International Preliminary Examining Authority on:

12 February 1999 (12.02.99)

[ ] in a notice effecting later election filed with the International Bureau on:

2. The election [X] was

[ ] was not

made before the expiration of 19 months from the priority date or, where Rule 32 applies, within the time limit under Rule 32.2(b).

The International Bureau of WIPO **34, chemin des Colombettes** **1211 Geneva 20, Switzerland**	Authorized officer A. Karkachi
Facsimile No.: (41-22) 740.14.35	Telephone No.: (41-22) 338.83.38

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PATENT COOPERATION TREATY

REC'D 21 MAY 1999
WIPO PCT

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INTERNATIONAL PRELIMINARY EXAMINATION REPORT

(PCT Article 36 and Rule 70)

Applicant's or agent's file reference 234/231-PCT	FOR FURTHER ACTION	See Notification of Transmittal of International Preliminary Examination Report (Form PCT/IPEA/416)
International application No. PCT/US98/15411	International filing date *(day/month/year)* 24 JULY 1998	Priority date *(day/month/year)* 25 JULY 1997
International Patent Classification (IPC) or national classification and IPC Please See Supplemental Sheet.		
Applicant LIGAND PHARMACEUTICALS INCORPORATED		

1. This international preliminary examination report has been prepared by this International Preliminary Examining Authority and is transmitted to the applicant according to Article 36.

2. This REPORT consists of a total of 5 sheets.

   ☐ This report is also accompanied by ANNEXES, i.e., sheets of the description, claims and/or drawings which have been amended and are the basis for this report and/or sheets containing rectifications made before this Authority. (see Rule 70.16 and Section 607 of the Administrative Instructions under the PCT).

   These annexes consist of a total of 2 sheets.

3. This report contains indications relating to the following items:

   I ☒ Basis of the report

   II ☐ Priority

   III ☒ Non-establishment of report with regard to novelty, inventive step or industrial applicability

   IV ☐ Lack of unity of invention

   V ☒ Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement

   VI ☐ Certain documents cited

   VII ☐ Certain defects in the international application

   VIII ☐ Certain observations on the international application

Date of submission of the demand	Date of completion of this report
12 FEBRUARY 1999	06 MAY 1999
Name and mailing address of the IPEA/US Commissioner of Patents and Trademarks Box PCT Washington, D.C. 20231 Facsimile No. (703) 305-3230	Authorized officer IREM YUCEL Telephone No. (703) 308-0196 JOYCE BRIDGERS PARALEGAL SPECIALIST CHEMICAL MATRIX

Form PCT/IPEA/409 (cover sheet) (January 1994)*

INTERNATIONAL PRELIMINARY EXAMINATION REPORT

International application No.
PCT/US98/15411

I. Basis of the rep rt

1. This report has been drawn on the basis of *(Substitute sheets which have been furnished to the receiving Office in response to an invitation under Article 14 are referred to in this report as "originally filed" and are not annexed to the report since they do not contain amendments)*:

[X] the international application as originally filed.

[X] the description, pages 1-86 , as originally filed.
pages NONE , filed with the demand.
pages NONE , filed with the letter of _____.
pages _____ , filed with the letter of _____.

[X] the claims, Nos. 1-25 , as originally filed.
Nos. NONE , as amended under Article 19.
Nos. NONE , filed with the demand.
Nos. NONE , filed with the letter of _____.
Nos. _____ , filed with the letter of _____.

[X] the drawings, sheets/~~fig~~ 1-7 , as originally filed.
sheets/~~fig~~ NONE , filed with the demand.
sheets/~~fig~~ NONE , filed with the letter of _____.
sheets/~~fig~~ _____ , filed with the letter of _____.

2. The amendments have resulted in the cancellation of:

[X] the description, pages none.

[X] the claims, Nos. none.

[X] the drawings, sheets/~~fig~~ none.

3. [ ] This report has been established as if (some of) the amendments had not been made, since they have been considered to go beyond the disclosure as filed, as indicated in the ~~Supplemental Box~~ Additional observations below (Rule 70.2(c)).

4. Additional observations, if necessary:

NONE

III. Non-establishment of opinion with regard to novelty, inventive step and industrial applicability

The question whether the claimed invention appears to be novel, to involve an inventive step (to be non-obvious), or to be industrially applicable have not been and will not be examined in respect of:

☐ the entire international application.

☒ claims Nos. 9-14

because:

☐ the said international application, or the said claim Nos. _ relate to the following subject matter which does not require international preliminary examination *(specify)*.

☐ the description, claims or drawings *(indicate particular elements below)* or said claims Nos. _ are so unclear that no meaningful opinion could be formed *(specify)*.

☐ the claims, or said claims Nos. _ are so inadequately supported by the description that no meaningful opinion could be formed.

☒ no international search report has been established for said claims Nos. 9-14.

INTERNATIONAL PRELIMINARY EXAMINATION REPORT

International application No.
PCT/US98/15411

V. Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement

1. STATEMENT

Novelty (N)	Claims	1-8 and 15-25	YES
	Claims	none	NO
Inventive Step (IS)	Claims	1-8 and 15-25	YES
	Claims	none	NO
Industrial Applicability (IA)	Claims	1-8 and 15-25	YES
	Claims	none	NO

2. CITATIONS AND EXPLANATIONS

Claims 1-8 and 15-25 meet the criteria set out in PCT Article 33(2)-(4), because the prior art does not teach or fairly suggest the control regions of the human PPARγ gene. The prior art does not teach nor fairly suggest methods of screening for agents which modulate expression of the human PPARγ gene by using the control region of the human PPARγ gene in reporter gene constructs. Further the claimed invention recited by the instant claims has industrial applicability.

---------- NEW CITATIONS ----------

NONE

Supplemental Box
(To be used when the space in any of the preceding boxes is not sufficient)

Continuation of: Boxes I - VIII

CLASSIFICATION:

The International Patent Classification (IPC) and/or the National classification are as listed below:

IPC(6): C07H 21/02, 21/04; C12N 5/06, 5/08, 5/10; C12Q 1/02, 1/68; C12P 21/06 and US Cl.: 536/23.1, 23.5, 24.1; 435/6, 29, 69.1, 357, 365, 370

INTERNATIONAL SEARCH REPORT

International application No.
PCT/US98/15411

A. CLASSIFICATION OF SUBJECT MATTER

IPC(6) :Please See Extra Sheet.
US CL :536/23.1, 23.5, 24.1; 435/6, 29, 69.1, 357, 365, 370

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

U.S. : 536/23.1, 23.5, 24.1; 435/6, 29, 69.1, 357, 365, 370

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

NONE

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)

Please See Extra Sheet.

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A, P	US 5,686,596 A (MUKHERJEE) 11 November 1997, see entire document.	1-8, 15-25
A, P	FAJAS et al. The Organization, Promoter Analysis, and Expression of the Human PPAR gamma Gene. The Journal of Biological Chemistry. 25 July 1997, Vol. 272, No. 30, pages 18799-18789, see entire document.	1-8, 15-25
Y, P	US 5,726,041 A (CHRESPI et al.) 10 March 1998, see entire document.	1-8, 15-25
Y	GEARING et al. Structure of the Mouse Peroxisome Proliferator Activated Receptor alpha Gene. Biochemical and Biophysical Research Communications. 28 February 1994, Vol. 199, No. 1, pages 255-263, see entire document.	1-8, 15-25

[X] Further documents are listed in the continuation of Box C. [ ] See patent family annex.

*	Special categories of cited documents:	"T"	later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention
"A"	document defining the general state of the art which is not considered to be of particular relevance	"X"	document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone
"E"	earlier document published on or after the international filing date	"Y"	document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art
"L"	document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)	"&"	document member of the same patent family
"O"	document referring to an oral disclosure, use, exhibition or other means		
"P"	document published prior to the international filing date but later than the priority date claimed		

Date of the actual completion of the international search 25 SEPTEMBER 1998	Date of mailing of the international search report 28 OCT 1998
Name and mailing address of the ISA/US Commissioner of Patents and Trademarks Box PCT Washington, D.C. 20231 Facsimile No. (703) 305-3230	Authorized officer IREM YUCEL Telephone No. (703) 308-0196

Form PCT/ISA/210 (second sheet)(July 1992)★

INTERNATIONAL SEARCH REPORT

International application No.
PCT/US98/15411

C (Continuation). DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
Y	ZHU et al. Structural organization of mouse peroxisome proliferator-activated receptor gamma (mPPARgamma) gene: Alternative promoter use and different splicing yield two mPPR gamma isoforms. Proceedings of National Academy of Sciences, U.S.A. August 1995, Vol. 92, pages 7921-7925, see entire document.	1-8, 15-25

INTERNATIONAL SEARCH REPORT

International application No.
PCT/US98/15411

Box I Observations where certain claims were found unsearchable (Continuation of item 1 of first sheet)

This international report has not been established in respect of certain claims under Article 17(2)(a) for the following reasons:

1. ☐ Claims Nos.:
because they relate to subject matter not required to be searched by this Authority, namely:

2. ☒ Claims Nos.: 9-14
because they relate to parts of the international application that do not comply with the prescribed requirements to such an extent that no meaningful international search can be carried out, specifically:

Please See Extra Sheet.

3. ☐ Claims Nos.:
because they are dependent claims and are not drafted in accordance with the second and third sentences of Rule 6.4(a).

Box II Observations where unity of invention is lacking (Continuation of item 2 of first sheet)

This International Searching Authority found multiple inventions in this international application, as follows:

1. ☐ As all required additional search fees were timely paid by the applicant, this international search report covers all searchable claims.

2. ☐ As all searchable claims could be searched without effort justifying an additional fee, this Authority did not invite payment of any additional fee.

3. ☐ As only some of the required additional search fees were timely paid by the applicant, this international search report covers only those claims for which fees were paid, specifically claims Nos.:

4. ☐ No required additional search fees were timely paid by the applicant. Consequently, this international search report is restricted to the invention first mentioned in the claims; it is covered by claims Nos.:

Remark on Protest

☐ The additional search fees were accompanied by the applicant's protest.

☐ No protest accompanied the payment of additional search fees.

INTERNATIONAL SEARCH REPORT

International application No.
PCT/US98/15411

A. CLASSIFICATION OF SUBJECT MATTER:
IPC (6):

C07H 21/02, 21/04; C12N 5/06, 5/08, 5/10; C12Q 1/02, 1/68; C12P 21/06

B. FIELDS SEARCHED
Electronic data bases consulted (Name of data base and where practicable terms used):

APS, STN (CAPLUS), DIALOG (MEDLINE, BIOSIS, SCISEARCH)
TERMS: PPAR, peroxisome proliferator activated receptor?, genom? clon? untranslate? region? sequence? regulat? control? element? human?

BOX I. OBSERVATIONS WHERE CLAIMS WERE FOUND UNSEARCHABLE
2. Where no meaningful search could be carried out, specifically:

The above claims are drawn to specific sequences or specific regions (subsequences) of particular genes. The CRF submitted in response to a telephone call to Applicant's representative did not comply with the sequence rules. Applicant's representative was FAXed a copy of the error report, but has not yet submitted a subsequent CRF.

FOR THE PURPOSES OF INFORMATION ONLY

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DK	Denmark	**LK**	Sri Lanka	**SE**	Sweden		
EE	Estonia	**LR**	Liberia	**SG**	Singapore		

SEQUENCE LISTING

<110> Michael R. Briggs
Regis S. Saladin
Johan Auwerx
Lluis Fajas

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<213> LF-27

<400> 14

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<213> LF-28

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<400> 16

gagctccagg ggttgtagca ggttgtctt 29

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<211> 28

<212> DNA

<213> LF-33

<400> 17

gacgggctga ggagaagtca cactctga 28

<210> 18

<211> 28

<212> DNA

<213> LF-35

<400> 18

agcatggaat aggggtttgc tgtaattc 28

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<211> 24

<212> DNA

<213> LF-36

<400> 19

tagtacaagt ccttgtagat ctcc 24

<210> 20

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<212> DNA

<213> LF-44

<400> 20

gtcggcctcg aggacaccgg agag 24

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<213> LF-58

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<211> 26

<212> DNA

<213> AII J PPRE

<400> 24

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<210> 25

<211> 30

<212> DNA

<213> ACO PPRE

<400> 25

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<210> 26

<211> 27

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<213> LPL PPRE

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<213> γ AS

<400> 27

gcattatgag catccccac 19

<210> 28

<211> 20

<212> DNA

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<400> 28

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<210> 29

<211> 19

<212> DNA

<213> γ2S

<400> 29

gcgattcctt cactgatac 19

<210> 30

<211> 52

<212> DNA

<213> CDS

<400> 30

ttctagaatt cagcggccgc tttttttttt tttttttttt tttttttttt vn 52

<210> 31

<211> 201

<212> DNA

<213> PPARγ1 proximal promoter

<400> 31

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ccgacccgga tccgccgccg cgggcaggcg gggcccagcg cactcggagc ccgagcccga 120
gccgcagccg ccgcctgggg cgcttgggtc ggcctcgagg acaccggaga ggggcgccac 180
gccgccgtgg ccgcagaaat g 201

<210> 32

<211> 177

<212> DNA

<213> PPARγ2 proximal promoter

<400> 32

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gggtgtattc acgattctgt tacttcaagt ctttttcttt taacggattg atcttttgct 120
agatagagac aaaatatcag tgtgaattac agcaaaccca tattccatgc tgttatg 177

<210> 33

<211> 468

<212> DNA

<213> PPARγ3 proximal promoter

<400> 33

taatcctttt aaggtctagt ttttcttaag tctgtgcagt aatagaggta tcgtcattca 60
tgtgacataa aagatggaaa ggggcttcat tcatgttagt gatggaaata ggaaagtagg 120
tgaagtgatt ttaatagatg tttcttttat gaaataattt ttaaagattg tccagccctg 180
catgatttat gatgaatcat tttgtggtct gttagttact tttagagaat agaaagcatt 240
gtaggctcag ggaaagcaaa cattcagaat gaaatccaat agagaaggta aatttatttg 300
ggcatgtaca ttttggcagc ctaggctgtg tacatgtgta cacattctga acatgtgtgt 360
atattgaaaa tcttgtctct tttttattgt taagatttga aagaagccga cactaaacca 420
ccaatataca acaaggccat tttgtcaaac gagagtcagc ctttaacg 468

<210> 34

<211> 1433

<212> DNA

<213> PPARγ3 promoter, exon A2, and intron A2

<400> 34

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tttcgctgtg gtgctcaggc tggtctccaa ctcctgggct caagcaatcc gcctgcctca 120
gccttccaaa gtgaaaaggt tttctctcat ttttcaaata gaagtactaa acaatgccag 180
agaaataaat aaacaggcaa aatacgttgg ctatagttta tattatttcc tgctacagtt 240
aacaaaatgg gaagacattt tatcttcatg gtctactaca tttatgccat gtgttaagta 300
ataaaatagc ttttgtaaat tataaattaa aaggtacaga tttaaaagag aaaatactgt 360
agagttttca tgtaggtaag actgtgtaga atgtcgggtc tcgatgttgg cgctattcaa 420
gccctgatga taaggctttt ggcattagat gctgttttgt cttcatggaa aatacagcta 480
ttctaggatc cttgagcctt tcataagaga taaggttgtg aatcctaaga ccctaggacc 540
atttacttag atgatctgct ctctggttcg tcctctgaaa agtctgcttc gtgaggggtg 600
tgctgcattt gccttgccta agtggtgtgg cacacaactg tactgtcacc ttaggcttaa 660
taaccatgtg tcatctagaa tgaagttata ttttaaaaag gatcgttttt gccatgtata 720
aattttcaaa cattaacttt cagggttatt aatccttta aggtctagtt tttcttaagt 780
ctgtgcagta atagaggtat cgtcattcat gtgacataaa agatggaaag gggcttcatt 840
catgttagtg atggaaatag gaaagtaggt gaagtgattt taatagatgt ttcttttatg 900
aaataatttt taaaagattg tccagccctg catgatttat gatgaatcat tttgtggtct 960
gttagttact tttagagaat agaaagcatt gtaggctcag ggaaagcaaa cattcagaat 1020
gaaatccaat agagaaggta aatttatttg ggcatgtaca ttttggcagc ctaggctgtg 1080
tacatgtgta cacattctga acatgtgtgt atattgaaaa tcttgtctct tttttattgt 1140
taagatttga aagaagccga cactaaacca ccaatataca acaaggccat tttctcaaac 1200
gagagtcagc ctttaacggt aagtaaaatc agaatttata ctgcatttgt attgaaaagt 1260
atccctttta aagaatatgt aaattataca ttgttatttt attgtaaaat ttcctagaga 1320
gtgatttttg actattataa tactttctgc tatataattt tccagtcagt tggactatgc 1380
agtgtaacat atttgtctaa cacaaaacaa aggtaagata ggaaaatgac ctagaagttg 1440
agaaataact caaatcctta aaa 1433

<210> 35

<211> 695

<212> DNA

<213> Intron B, exon 1, and intron 1

<400> 35

ctgggataac aggtgtgagc cactgtgcct ggcctgtata ctataagttt aaaatttttg 60
tctattatac tcaataaagc tggacaaaat tttaaataaa taacagcagt cattaacaga 120
ctcaattgat gacctaatgt agaagttaat gagagcaggc ctgttggcaa aaaggcattt 180
atatggatac actgtatgta tctgcactgt ttcaggatcc tctattatga tacctgggta 240
aagggtgact tccttttctat cataaaacag cctagacagc actaagaagg tggttatgtt 300
cttttctgtt gttgtgagcg cccagatgag attactttgc caaagactct tttcatttct 360
ctttctgaaa ctctgtgaga ttgctgtgtt ctctaggact taacttcaca gctagtctat 420
ttttcctttc agaaatgacc atggttgaca cagagatgcc attctggccc accaactttg 480
ggatcagctc cgtggatctc tccgtaatgg aagaccactc ccactccttt gatatcaagc 540
ccttcactac tgttgacttc tccagcattt ctactccaca ttacgaagac attccattca 600
caagaacaga tccagtggtt gcagattaca agtatgacct gaaacttcaa gagtaccaaa 660
gtatgatgtt tgttttcact tttcagacta ctagg 695

<210> 36

<211> 313

<212> DNA

<213> Intron 1, exon 2, and intron 2

<400> 36

ctgttttcat gggataatta tcctctcaca tgtctccata cacaggtgca atcaaagtgg 60
agcctgcatc tccaccttat tattctgaga agactcagct ctacaataag cctcatgaag 120
agccttccaa ctccctcatg gcaattgaat gtcgtgtctg tggagataaa gcttctggat 180
ttcactatgg agttcatgct tgtgaaggat gcaaggtaat taaaaaaaaa gtcttcaaag 240
aaattgttga aactttatta tttcatttca gcagaacccc ttttttaggt gatacaatat 300
atgaattttt ttt 313

<210> 37

<211> 473

<212> DNA

<213> Intron 2, exon 3, and intron 3

<400> 37

gataccttttc gctgtaggtt cgtgcttcca tgtgtcataa agacttaaaa tttgcttctt 60

ttttatccct ttgcagggtt tcttccggag aacaatcaga ttgaagctta tctatgacag 120
atgtgatctt aactgtcgga tccacaaaaa aagtagaaat aaatgtcagt actgtcggtt 180
tcagaaatgc cttgcagtgg ggatgtctca taatggtaag taaacagtca tcaccatata 240
ctttattatt ctcattatag ctgccagacc agtggacact aaagccattg ccaaaaatgt 300
gtacagtttt tccaccaaat gccagaattt agaatattgc atggcgataa aacatttctc 360
ttttaggtca gtgtttttaa agttttatta tagaaccttt ctctctgtgg ttgggcatct 420
gccatgagga gaaaagagac ttgaaaaatc tgggggatta tgggaaaaac ctt 473

<210> 38

<211> 706

<212> DNA

<213> Intron 3, exon 4, and intron 4

<400> 38

acaactttga attctgcaca gtttcgtatt ttaattcgtg aaacgtgttg atccttctaa 60
gtgcctgacc ttaggtcaag tgctggggat acaaagaagg tgacctttga attgggtctt 120
gagggatgag taggagttgg ttctcaatta tttcacgttt aagtcgacat acttccctcc 180
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gaaagttaac ggtttaattt ttactgatgg tctgtgctac ttttgtgaaa taaaaacatg 300
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ggagaagctg ttggcggaga tctccagtga tatcgaccag ctgaatccag agtccgctga 540
cctccgtgcc ctggcaaaac atttgtatga ctcatacata aagtccttcc cgctgaccaa 600
agcaaaggcg agggcgatct tgacaggaaa gacaacagac aaatcagtta gttctcttct 660
gctgtcttca ttgggggagg cgggaagttg ttttgggatt tttgtt 706

<210> 39

<211> 732

<212> DNA

<213> Intron 4, exon 5, and intron 5

<400> 39

gggaaagaag accaaaattg gtgaaatatg tttggtccca gaagataatt aagatgaata 60
aaagaacttg agagtatttt ctcattatta agcatcttca gctttaaaga ttttagttag 120
caaagcaagt ttacataaac agttttctga acctgggatg gcattcactg tgagttagaa 180
atctccaagt catcccacgt tttccctgtt ttatttgcag ccattcgtta tctatgacat 240
gaattcctta atgatgggag aagataaaat caagttcaaa cacatcaccc ccctgcagga 300
gcagagcaaa gaggtggcca tccgcatctt tcagggctgc cagtttcgct ccgtggaggc 360
tgtgcaggag atcacagagt atgccaaaag cattcctggt tttgtaaatc ttgacttgaa 420
cgaccaagta actctcctca aatatggagt ccacgagatc atttacacaa tgctggcctc 480
cttgatgaat aaagatgggg ttctcatatc cgagggccaa ggcttcatga caagggagtt 540
tctaaagagc ctgcgaaagc cttttggtga ctttatggag cccaagtttg agtttgctgt 600
gaagttcaat gcactggaat tagatgacag cgacttggca atatttattg ctgtcattat 660
tctcagtgga ggtaagattt gtcttttgat cttctatgaa agagggtggg atgatggtgg 720
ggtggccaaa ag 732

<210> 40

<211> 592

<212> DNA

<213> Intron 5, exon 6, and 3' UTR

<400> 40

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gagntgcnta ggcctccaag gcggggccca gaggattttt tgactgaacc ccctgttgtg 120
ttttccatat gtgcttcccc agaccgccca ggtttgctga atgtgaagcc cattgaagac 180
attcaagaca acctgctaca agccctggag ctccagctga agctgaacca ccctgagtcc 240
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cacgtgcagc tactgcaggt gatcaagaag acggagacag acatgagtct tcacccgctc 360
ctgcaggaga tctacaagga cttgtactag cagagagtcc tgagccactg ccaacatttc 420
ccttcttcca gttgcactat tctgagggaa aatctgacca taagaaattt actgtgaaaa 480
agcgttttaa aaagaaaagg gtttagaata tgatctattt tatgcatatt gtttataaag 540
acacatttac aatttacttt taatattaaa aattaccata ttatgaaatt gc 592

<210> 41

<211> 13

<212> DNA

<213> PPARγ3-E-box

<400> 41

attcatgtga cat 13

<210> 42

<211> 13

<212> DNA

<213> PPARγ3-E-box

<400> 42

attcatgcat cat 13

<210> 43

<211> 13

<212> DNA

<213> A1 (97) Donor

<400> 43

cgcaggtcag agt 13

<210> 44

<211> 13

<212> DNA

<213> A1 (97) Acceptor

<400> 44

ttgttaagat ttg 13

<210> 45

<211> 13

<212> DNA

<213> A2 (74) Donor

<400> 45

taacggtaag taa 13

<210> 46

<211> 13

<212> DNA

<213> A2 (74) Acceptor

<400> 46

cctttcagaa atg 13

<210> 47

<211> 12

<212> DNA

<213> B (211) Donor

<400> 47

caaggtaaag tt 12

<210> 48

<211> 13

<212> DNA

<213> B (211) Acceptor

<400> 48

cctttcagaa atg 13

<210> 49

<211> 12

<212> DNA

<213> 1 (213) Donor

<400> 49

caaagtatga tg 12

<210> 50

<211> 13

<212> DNA

<213> 1 (231) Acceptor

<400> 50

atacacaggt gca 13

<210> 51

<211> 12

<212> DNA

<213> 2 (170) Donor

<400> 51

caaggtaatt aa 12

<210> 52

<211> 12

<212> DNA

<213> 2 (170) Acceptor

<400> 52

ctttgcaggg tt 12

<210> 53

<211> 12

<212> DNA

<213> 3 (139) Donor

<400> 53

aatggtaagt aa 12

<210> 54

<211> 13

<212> DNA

<213> 3 (139) Acceptor

<400> 54

ctctatagcc atc 13

<210> 55

<211> 12

<212> DNA

<213> 4 (203) Donor

<400> 55

atcagttagt tc 12

<210> 56

<211> 12

<212> DNA

<213> 4 (203) Acceptor

<400> 56

atttgcagcc at 12

<210> 57

<211> 12

<212> DNA

<213> 5 (451) Donor

<400> 57

ggaggtaaga tt 12

<210> 58

<211> 13

<212> DNA

<213> 5 (451) Acceptor

<400> 58

ttccccagac cgc 13

<210> 59

<211> 12

<212> DNA

<213> 6 (248) Donor

<400> 59

tactagcaga ga 12

<210> 60

<211> 44

<212> DNA

<213> Adaptor

<400> 60

ctaatacgac tcactatagg gctcgagcgg ccgcccgggc aggt